

**IN THE CLAIMS**

Please amend the claims as follows.

1. (Currently Amended) A production method for a paper pulp, comprising steps of:

(a) providing a culture solution;

(b) adding a fiber plant into said culture solution;

(c) adding a suspension of a microorganism into said culture solution wherein said microorganism is one selected from a group consisting of a Bacillus licheniformis (~~PMBP-m5~~) having been deposited under ATCC Accession No: PTA-5824, a Bacillus subtilis (~~PMBP-m6~~) having been deposited under ATCC Accession No: PTA-5818, and a Bacillus amyloliquefaciens having been deposited under ATCC Accession No: PTA-5819 (~~PMBP-m7~~), ~~which are isolated from one of a fiber plant and a livestock excrement compost~~;

(d) fermentatively culturing said culture solution for preparing a pulp solution;

(e) boiling said pulp solution;

(f) pulping said pulp solution; and

(g) screening said pulp solution for isolating a paper pulp from said pulp solution.

2. (Original) The method as claimed in claim 1, wherein said fiber plant is a non-woody fiber plant.

3. (Original) The method as claimed in claim 1, wherein said fiber plant is pretreated by one selected from a group consisting of a relatively high pressure treatment under a relatively high temperature, a steaming treatment under a

relatively high temperature, a boiling treatment under a relatively high temperature, a fumigated treatment and a soaking treatment under a room temperature.

4. (Previously Amended) The method as claimed in claim 1, wherein said fiber plant is added into said culture solution in a ratio ranged from 4 to 15% (w/v).

5. (Canceled)

6. (Original) The method as claimed in claim 1, wherein said microorganism is inoculated at a concentration ranged from 0 to  $10^8$  cfu / ml.

7. (Original) The method as claimed in claim 1, wherein said microorganism is a Gram positive bacterium.

8. (Canceled)

9. (Original) The method as claimed in claim 1, wherein said fermentatively culturing process is proceeded at a temperature ranged from 20 to 50°C.

10. (Original) The method as claimed in claim 1, wherein said fermentatively culturing process is one of a static culture and a shaking culture.

11. (Previously amended) The method as claim in claim 1, wherein said fermentatively culturing process is proceeded over 0 to 10 days.

12. (Currently amended) The method as claimed in claim 1, wherein said step (e) further comprises a step of adding CaO with a concentration ranged from 0 to 4 % (w/v) into said pulp solution and boiling said pulp solution for 25 to 40 minutes under within a temperature ranged from 120°C to 150°C.

13. (Previously Amended) The method as claim in claim 1, wherein said pulp solution is screened by 18 to 300 meshes.

14. (Currently Amended) A biopulping method for a non-woody fiber plant, comprising steps of:

(a) providing a culture solution;

(b) adding a non-woody fiber plant into said culture solution;

(c) adding a suspension of a microorganism into said culture solution wherein said microorganism is one selected from a group consisting of a *Bacillus licheniformis* having been deposited under ATCC Accession NO: PTA-5824 (PMBP-m5), a *Bacillus subtilis* having been deposited under ATCC Accession NO: PTA-5818 (PMBP-m6) and a *Bacillus amyloliquefaciens* having been deposited under ATCC Accession NO: PTA-5819 (PMBP-m7), ~~which are isolated from one of a fiber plant and a livestock excrement compost~~;

(d) fermentatively culturing said culture solution for preparing a pulp solution;

(e) boiling said pulp solution;

(f) pulping said pulp solution; and

(g) screening said pulp solution for isolating a paper pulp from said pulp solution.

15. (Original) The method as claimed in claim 14, wherein said fiber plant is pretreated by one selected from a group consisting of a relatively high pressure treatment under a relatively high temperature, a steaming treatment under a relatively high temperature, a boiling treatment under a relatively high temperature, a fumigated treatment and a soaking treatment under a room temperature.

16. (Original) The method as claimed in claim 14, wherein said inoculation concentration of a microorganism is at a range from 0 to  $10^8$  cfu / ml.

17. (Canceled)

18. (Currently Amended) The method as claimed in claim [[12]] 14, wherein said step (e) further comprises a step of adding CaO with a concentration ranged from 0 to 4 % (w/v) into said pulp solution and boiling said pulp solution for 25 to 40 minutes under within a temperature ranged from 120 °C to 150 °C.

19. (Previously Amended) The method as claim in claim 14, wherein said pulp solution is screened by 18 to 300 meshes.

20-22. (Canceled).